

Electronic Supplementary Information

The growth mechanism of zinc oxide and hydrozincite: a study using electron microscopy and in-situ SAXS

Marko Bitenc^{a,b}, Peter Podbršček^a, Pavo Dubček^c, Sigrid Bernstorff^d, Goran Dražić^e, Bojan Orel^f, Zorica Crnjak Orel^{a,b}

^a National Institute of Chemistry Slovenia, Hajdrihova 19, SI-1001, Slovenia Ljubljana. Fax: +386 1 476 0300; Tel: +386 1 476 0236; E-mail: zorica.crnjak.orel@ki.si

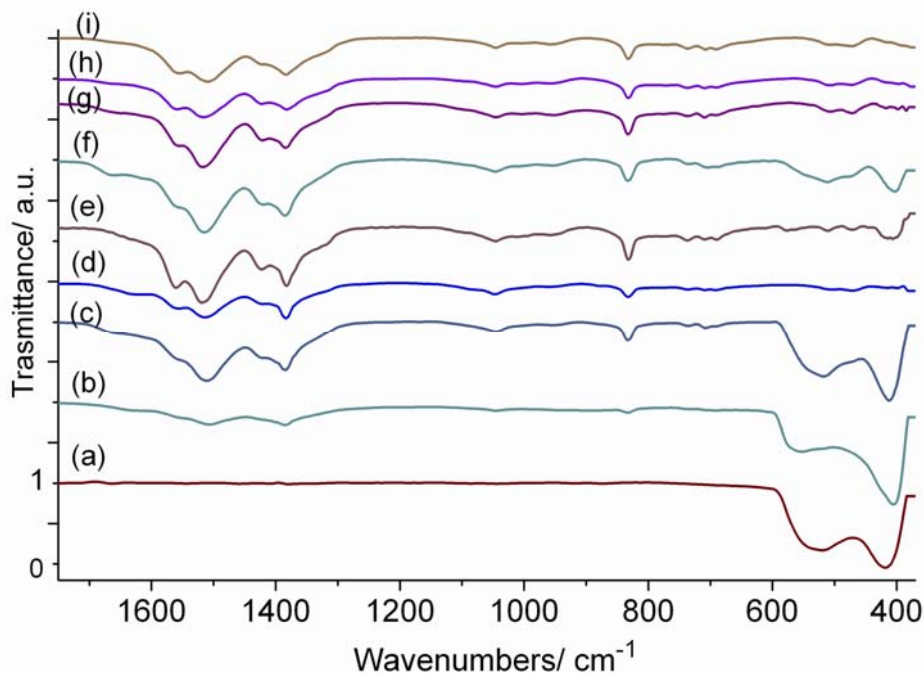
^b Centre of Excellence for Polymer Materials and Technologies, Tehnološki park 24, 1000 Ljubljana, Slovenia.

^c Materials Research Dept., Ruđer Bošković Institute, P.O. Box 180, 10002, Zagreb Croatia.

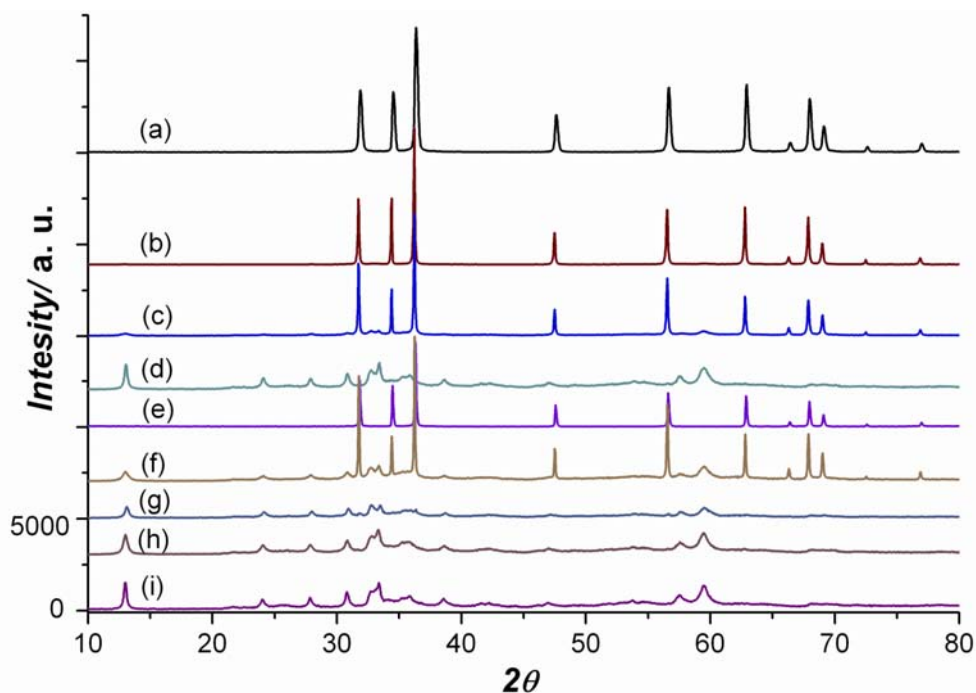
^d Sincrotrone Trieste, S.C.p.A., I-34012 Basovizza TS, Italy.

^e Jožef Stefan Institute, Jamova 39, SI-1000, Ljubljana, Slovenia.

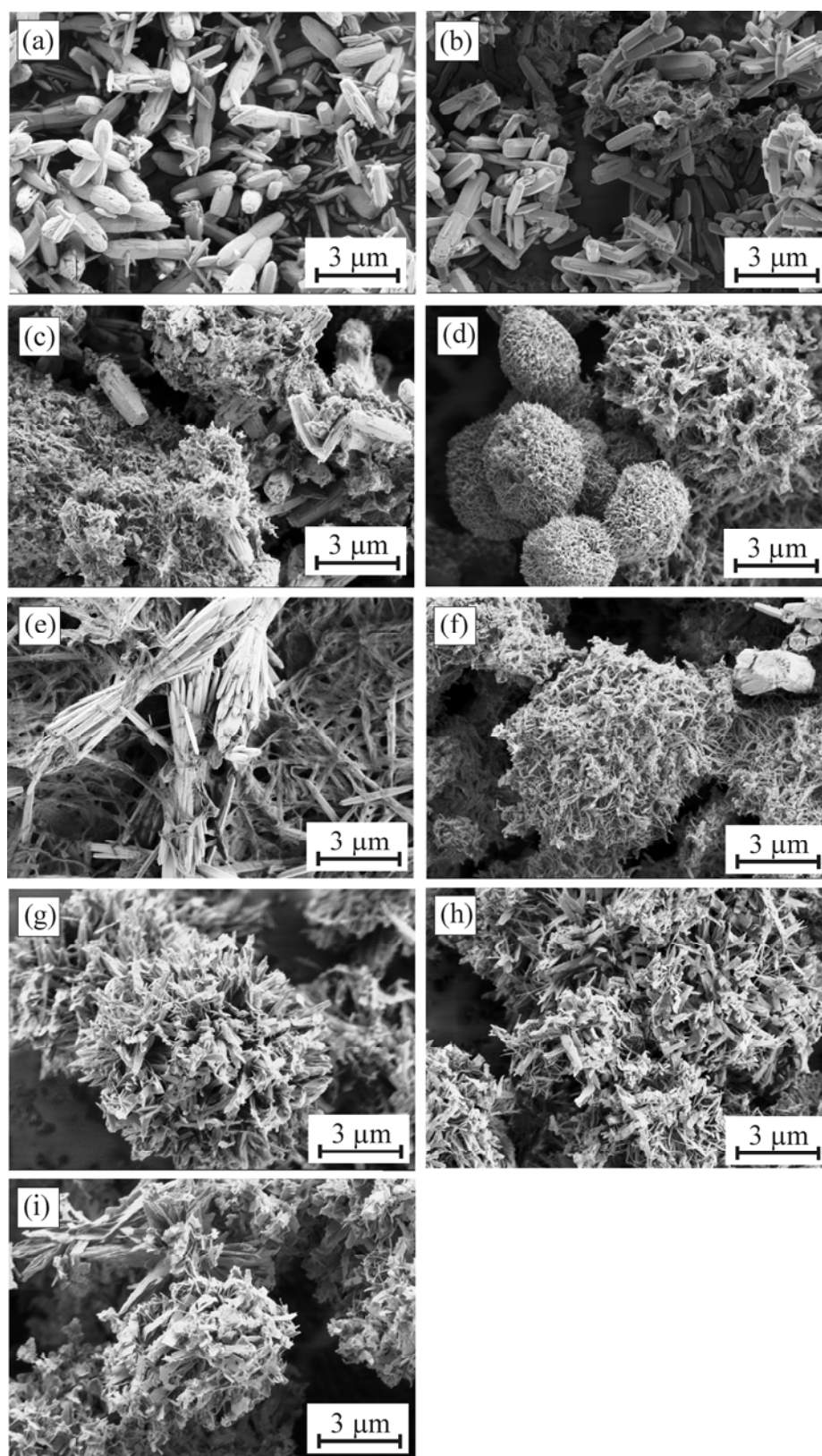
^f Faculty of Computer and Information Science, University of Ljubljana, Tržaška cesta 25, SI-1000, Ljubljana, Slovenia.



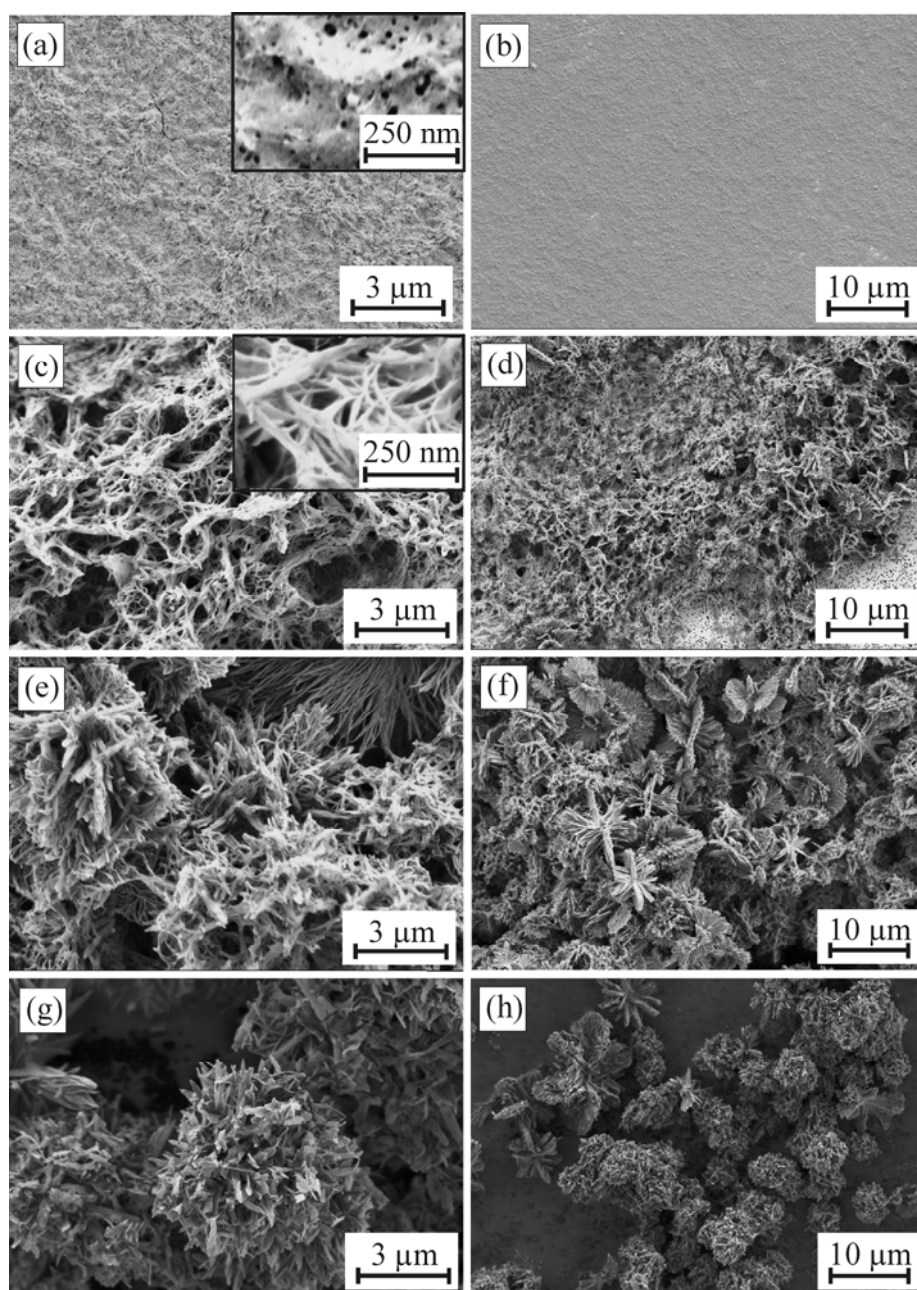
ESI Figure 1: FTIR spectra of: (a) – Sample A2, (b) – Sample A3, (c) – Sample B2, (d) – Sample B3, (e) – Sample C1, (f) – Sample C2, (g) – Sample D1, (h) – Sample D2 and (i) – Sample D3.



ESI Figure 2: XRD spectra of: (a) – Sample A2, (b) – Sample A3, (c) – Sample B2, (d) – Sample B3, (e) – Sample C1, (f) – Sample C2, (g) – Sample D1, (h) – Sample D2 and (i) – Sample D3.



ESI Figure 3: FE-SEM micrographs of the samples morphology after 2 hours of synthesis: (a) – Sample A2, (b) – Sample A3 and (c) – Sample B2, (d) – Sample B3, (e) – Sample C1, (f) – Sample C2, (g) – Sample D1, (h) – Sample D1 and (i) – Sample D3.



ESI Figure 4: FE-SEM micrographs of Sample D3 (Zn 0.05 M, urea 0.25 M, water) after various reaction times: (a, b) – 30 min, (c, d) – 45 min, (e, f) – 60 min and (g, h) – 90 min.